



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/048,119

06/10/2002

Reiner Gieck

449122022600

1678

25227 7590 06/11/2007  
MORRISON & FOERSTER LLP  
1650 TYSONS BOULEVARD  
SUITE 400  
MCLEAN, VA 22102

EXAMINER

AGHDAM, FRESHTEH N

ART UNIT

PAPER NUMBER

2611

MAIL DATE

DELIVERY MODE

06/11/2007

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

# Office Action Summary

Application No.

10/048,119

Applicant(s)

GIECK, REINER

Examiner

Freshteh N. Aghdam

Art Unit

2611

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 21 May 2007.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-9 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-4 is/are rejected.
- 7) ☒ Claim(s) 5-9 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## DETAILED ACTION

### *Continued Examination Under 37 CFR 1.114*

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 5/21/2007 has been entered.

### *Response to Arguments*

Applicant's arguments with respect to claims 1-9 have been considered but are moot in view of the new ground(s) of rejection.

### *Claim Rejections - 35 USC § 112*

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter, which the applicant regards as his invention.

Claim 1 recites the limitation " selecting **the transmission method** having **the transmission speed** in which **the** measured and **stored line parameters** are most compatible ". There is insufficient antecedent basis for this limitation in the claim. Therefore, examiner made the broadest reasonable interpretation of claim 1 for examining purposes.

***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claim 1 is rejected under 35 U.S.C. 102(e) as being anticipated by Goodson et al (US 5,715,277).

As to claim 1, Goodson discloses measuring line parameters of a line using at least one transmission method (Fig. 8, means 800; Col. 11, lines 6-17) selecting a transmission method having a transmission speed (e.g. rate/carrier frequency) in which the measured line parameters (e.g. SDR; Fig. 8, means 820, 830, 825, and 827) are most compatible with a different plurality of stored line parameters for which at least one transmission method with at least one transmission speed that represents a maximum data throughput rate is determined and stored in memory (Fig. 8, means 829 and 840; Col. 9, lines 30-67, Col. 11, lines 36-67).

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the

invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 2 and 4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Goodson et al, and further in view of BROTHERS (US 2002/0016794).

As to claim 2, Goodson discloses that the line parameters are represented by the attenuation of the line (Fig. 8, means 825). Goodson is not explicit about the line parameters are represented by the running time of the line and by interference signals on the line. BROTHERS discloses a communication method/ apparatus, wherein the line parameters are represented by the attenuation, interference, and running time of the line (Par. 19). Therefore, it would have been obvious to one of ordinary skill in the art to combine the teaching of BROTHERS with Goodson in order to more efficiently transmitting a signal by determining the line parameters responsive to the line attenuation, running time of the line and by interference signals on the line (Par. 19).

As to claim 4, Goodson discloses that the maximum data rate for different line parameters is determined with different transmission methods and transmission speeds, by selecting the transmission methods in the frequency range of which the line parameters demonstrate the least variations (Fig. 8, means 829 and 840; Col. 9, lines 30-67, Col. 11, lines 36-67). Goodson is not explicit about the line parameters are represented by the attenuation and running time of the line and by interference signals on the line. BROTHERS teaches that the line parameters are represented by the attenuation, interference, and running time of the line (Par. 19). Therefore, it would have been obvious to one of ordinary skill in the art to combine the teaching of BROTHERS with Goodson in order to more efficiently transmitting a signal by determining the line

Art Unit: 2611

parameters responsive to the line attenuation, running time of the line and by interference signals on the line (Par. 19).

Claim 3 is rejected under 35 U.S.C. 103(a) as being unpatentable over Goodson et al and BROTHERS, further in view of Zirwas (US 6,798,855).

As to claim 3, Goodson and BROTHERS teach all the subject matter claimed in claim 2, except for the running time being determined by a measurement of the phase difference between two signals with different frequencies. Zirwas teaches that the running time is determined by a measurement of the phase difference between two signals (Col. 7, Lines 30-35). Therefore, it would have been obvious to one of ordinary skill in the art to combine the teaching of Zirwas with Goodson and BROTHERS in order to enhance signal transmissions by determining the running time from measuring the phase difference between two signals with different frequencies.

#### ***Allowable Subject Matter***

Claims 5-9 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

#### ***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

McGhee (US 6,389,065) see summary of the invention.


Art Unit: 2611

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Freshteh N. Aghdam whose telephone number is 571-272-6037. The examiner can normally be reached on 9:00-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Chieh Fan can be reached on 571-272-3042. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

June 6, 2007

  
**KEVIN BURD**  
**PRIMARY EXAMINER**

Freshteh Aghdam  
Examiner  
Art Unit 2611